

Methodological aspects

This note gives a brief overview of the changes made in comparison to the previous edition of the satellite account of non-profit institutions which dates from December 2012. For a description of the target population and the general methodology, readers should refer to the February 2004 publication "[Le compte satellite des institutions sans but lucratif 2000-2001](#)", as well as the December 2012 publication "[The satellite account of non-profit institutions 2009-2010](#)".

1. Introduction

The previous edition of the satellite account of non-profit institutions (NPI) dates back to December 2012. Publication of this statistical tool had then been suspended as priority had to be given to other major projects, which were imperative in order to conform with the new European requirements as part of the changeover to ESA2010. Moreover, the year 2015 had seen other methodological improvements made to the main framework for the national account.

Now that things have reverted back to normal, with a more stable environment for the statistical productions, the NAI is now able to resume production of the NPI satellite. Being a satellite account, it is a statistical product that is not mandatory at European level. Nevertheless, the satellite account for non-profit institutions extends the range of statistical material available by collecting economic information on non-profit-making associations and having the additional advantage of being consistent with the definitions and booking rules specific to national accounting standards.

This new edition featuring the NPI satellite account reflects a catching-up effect with regard to the time horizon of the series presented. In December 2012, the satellite account had in fact been compiled with a new presentation and amended methodology so as to incorporate, for the first time, data drawn from annual accounts filed by non-profit institutions and foundations with the Central Balance Sheet Office¹. At the time and in view of this new context, the account satellite had been drawn up for the years 2009 and 2010. This new publication covers a much longer period, running from 2009 to 2014. The methods in place are still basically the same as those used in the 2012 edition. However, consistency with the central framework for the national accounts implies that all the methodological adaptations that have since affected this framework, including those concerning the transition to ESA2010, are reflected in this edition of the satellite account for non-profit institutions.

This new edition of the satellite account therefore features two particular advantages: it covers a longer period (2009-2014) and, for the first time, it comes under the national accounts established according to the ESA2010 methodology.

¹ For further details, readers are referred to the 2012 edition of the account mentioned at the beginning of this section.

2. Overview of methodological changes

As stipulated in ESA2010, all basic concepts and nomenclature from central framework of the national accounts must be kept in the satellite accounts. This central framework therefore provides the terms of reference, while enabling more specific statistical requirements to be met through the compilation of satellite accounts.

Compilation of the NPI satellite account is an integral part of this philosophy and methods that have been put in place are as consistent as possible with those applied throughout the national accounts.

The method of drawing up the NPI satellite account has not been changed since the last edition in 2012, not only as regards the sources of data used (principally the annual accounts filed by NPIs and foundations, NSSO data, information from the VAT office and the results of the structural survey on non-profit institutions), but also the methods of calculating the aggregates. It is worth recalling that, even though it is based very closely on data relating directly to the units making up the population of non-profit institutions, compiling the satellite account requires working assumptions to be made in some areas so the resultant figures should be regarded as estimates.

The satellite account uses data from the structural survey devoted to non-profit institutions to enable more detailed calculations mainly concerning breakdowns of more general aggregates. The format for this survey was revised in 2008. We have opted to recalculate the breakdown formulae based on the survey results by using averages from the 2010-2014 period. This method effectively helps to obtain results that are more representative and more stable¹. This change in the use of the survey findings may influence some of the estimates.

While the method of establishing the satellite account has not been changed, the methodological adaptations made under the central framework of the national accounts in 2014 and 2015 naturally feed through to the statistics on non-profit institutions provided they are relevant for this data.

A brief recap of the main adaptations to the methodology that have had some impact on the compilation of the NPI satellite account is given here. It is not an exhaustive inventory.

2.1 Capitalisation of R&D expenditure

As far as impact on the national accounts aggregates considered as a whole is concerned, the capitalisation of spending on R&D is certainly the most significant item introduced with the switchover to ESA2010.

Under ESA2010, expenditure on R&D must be recorded as gross fixed capital formation, i.e. as investment. This expenditure may be made by a firm for its own account, in which case it must be included in the estimate of this unit's output; they may also result from a purchase of R&D services which therefore does not have to be recorded in the firm's intermediate consumption. Either one of these two channels will increase value added of firms.

The new accounting treatment of R&D expenditure also applies to the compilation of the NPI satellite account. Calculations have been made for units considered individually, taking account of the results of the biennial surveys conducted by Belspo². However, we do not yet have full survey data for the year 2014 and an estimate has had to be made.

2.2 Harmonised use of nace codes by the NAI

In the past, one and the same economic unit could sometimes have been given a different activity code (NACE) by one or another partner within the NAI (Statistics Belgium, Federal Planning Bureau and National Bank of Belgium). The populations on which all the various statistics released by the NAI were based were thus not perfectly harmonised. The situation has been improved with the use, from 2009 onwards, of a single economic activity code

¹ 2008 and 2009 were two transition years for which the survey findings cannot be used. One particular feature of the survey is that it has been established on the basis of rotational sampling that specifically targets one or another group of activity depending on the years in question (industry and construction; trade, hotels and restaurants; services). It is therefore better to lump several successive surveys together so that all the branches of activity are more representative.

² Belgian Science Policy Office: *Service public de programmation de la Politique scientifique fédérale*.

commonly attributed by the NAI's partners. Incorporation of the economic activity code attributed by Statistics Belgium is the basis of this harmonisation effort.

For the statistics published by the Bank, this harmonisation has led to a certain number of units being reclassified under more appropriate activity codes. Since the satellite account gives series from 2009, the year in which the harmonised treatment of NACE codes was introduced, there has been no break in series as regards the breakdowns of the aggregates by branch of activity given in this issue of the account. However, compared with the previous edition of the account, the breakdowns by branch may have been affected by this.

2.3 General government boundary

Recent statistical developments have focused on what has come to be referred to as the redefinition of the general government boundary. There has been a wide-scale investigation of the units of production so as to determine whether a unit should be included in the general government sector (S.13) or not according to the criteria laid down by the ESA and, in some cases, clarified in Eurostat's Manual on Government Deficit and Debt (MGDD). Correct application of these criteria guarantees the consistent treatment needed to ensure comparability of statistics between the different entities in the country, and also at international level vis-à-vis other European countries.

Consequently, some NPIs may have been shifted over from the non-financial corporations sector (S.11) or that of NPIs serving households (S.15) to the general government sector (S.13). As the NPI satellite account does not cover those classified under the sector S.13, the reclassification of units under the latter has also affected the constitution of the satellite account. But the impact is only very marginal, with just a small effect on the wage bill estimated at around -1%.

2.4 Value added in the "hospital activities" branch and investment by hospitals revised upwards

In 2014, new data from FPS Public Health were incorporated into the central framework for the national accounts in order to establish statistics on hospital activities. This has led to an upward revision, since 1995, of both value added and investment attributed to hospitals. This revision also shows up in the statistics included in the NPI satellite account as some of the hospitals¹ fall within the population covered by the account.

In addition, the estimate of investment aid granted by the public authorities to the hospital sector has been revised by taking into account data from the COFOG (Classification of the Functions of the Government).

2.5 Consumption of fixed capital of NPIs serving households

As for the rest of the economy, consumption of fixed capital (amortisation) of sector S.15 covering non-profit institutions serving households (NPISHs) is determined as part of the calculations of capital stock made under the perpetual inventory method. This method is based on the cumulative stock of past investment, to which decommissioning and amortisation functions are applied. Investment therefore constitutes the basis for the estimates of capital stock and its depreciation.

Since it is rather cumbersome, this methodology had not been applied when investment figures for NPISHs were revised in 2011. Since then, the investment series (subject to a downward revision) has been integrated into the calculations of capital stock and has led to consumption of fixed capital for this sector being revised downwards. Estimation of amortisation has also been influenced by other changes such as the capitalisation of R&D expenditure.

One particular feature of the revision of amortisation in the NPISH sector is that it influences GDP because output (and thus value added) of NPISHs, as a non-market sector, is estimated according to the sum of production costs, which include consumption of fixed capital. These calculations are made under the central framework for the

¹ Hospitals that have a legal status of NPI or similar (non-profit-making) and which declare to the NSSO are covered by the NPI satellite account.

national accounts and integrated into the satellite account.

2.6 Treatment of targeted reductions in employer contributions

The methodological changes made in the central framework have also affected the treatment of targeted reductions in employers' social security contributions. According to Eurostat's recommendations, the targeted reductions in employer contributions¹ are no longer recorded as a cut in wages paid by employers (including NPIs) but are treated as subsidies: employee compensation has thus been revised upwards in their "social security contributions" component, as have subsidies to enterprises. This is effectively a so-called method of "grossing up" flows. The "gross-up" of the targeted social security contributions has been taken into consideration for the compilation of the NPI satellite account on the basis of individual data for units covered by the target population.

2.7 Gifts received by and paid by NPIs

The recent statistical developments in the NPISH account (S.15) have also focused on improving estimation of gifts received by households and paid by them. Classifying these gifts is actually quite difficult as NPIs' abridged accounting formats do not enable any clear identification. The work on the methodology led to an upward revision of gifts received by/paid to households which comes to roughly €1.5 billion more for NPISHs than in the previous edition from 2012. Conversely, transfers from general government have been revised downwards by about 2 billion, with part of them being reclassified as "other production subsidies" (D.39) in favour of NPIs classified under the non-financial corporations sector.

As part of the revision of treatment of gifts paid to households by NPISHs is the specific case of gifts in kind, which is discussed below.

TREATMENT OF GIFTS IN KIND

In the context of the revision of accounting rules for gifts paid by NPIs, the method of recording gifts in kind by NPISHs has been adapted.

These gifts were previously recorded as intermediate consumption of NPISH (P.2 transaction). According to the ESA standards, such gifts must be booked as current transfers paid by NPIs (D.75 transaction). It was therefore necessary to adapt the accounting treatment applied to them.

The new treatment of gifts in kind has an impact on the following statistical variables:

- a) intermediate consumption (P.2) which has to exclude gifts in kind;
- b) total output (P.1) estimated by the sum of production costs under ESA principles, and more precisely non-market output (P.13);
- c) final consumption expenditure of NPISH (P.3) which is determined by their non-market output;
- d) current transfers made by NPISHs (D.75) under which gifts in kind must be recorded.

In the October 2016 edition of the detailed national accounts, which constitutes the reference framework for this satellite account, it has only been possible to make this change for the entire statistical series from the year 2013 onwards. Under a so-called current revision, as has been the case in 2016, the GDP estimates (either using the production approach or the expenditure approach) are in fact only revised over the last few years. So this means that the statistical adaptations mentioned above in points (a), (b) and (c) have not been made in the October 2016 accounts for the years prior to 2013². By contrast, current transfers have been adapted from 1995 onwards because they do not interfere with the estimation of GDP.

As the NPI satellite account focuses specifically on the economic developments that have affected the voluntary

¹ These are either subsidies relating to specific categories of workers (disabled, long-term unemployed) or subsidies based on the cost of training arranged or financed by enterprises.

² These adjustments will be made in the central framework for the national accounts at the next so-called 'occasional' revision which provides an opportunity to update all the statistical series (including those for GDP) since 1995.

sector, a choice has been made to depart from the standard practice under the central framework for the national accounts just for this point. The statistical series for P.1 (in its P.13 component), P.2 and P.3 have therefore been adapted in this account over the period 2009-2012, so that the statistics given here are not spoiled by a break in the series. The corrections that have been made concern the following amounts: € 574 million in 2009, € 552 million in 2010, € 465 million in 2011 and € 590 million in 2012.

The new treatment of gifts in kind does not affect the estimate of value added because output and intermediate consumption of NPISHs have been adjusted, downwards, by identical amounts. By contrast, the increase in consumption of NPISHs (point (c) mentioned above) has an impact on savings and the net lending/net borrowing of the sector. The aggregates for the total economy, as set out in table 5 of this publication, have consequently been adapted too¹.

2.8 Statistics on paid employment

Statistics on paid employment are established for the national accounts on the basis of information from the NSSO, NSSO-PLA and NISSE (INASTI). Adjustments are made so as to avoid double counting, assuming that a person can only be counted once. The adjustments for double counting have been refined in the last few years, as regards their overall volume as well as the distribution between the different branches of activity. These adaptations have had some repercussions on the statistics established for the NPI sector, as the adjustments for double counting are imputed specifically to NPIs based on their share in total paid employment by branch of activity.

¹ This means that, for the years 2009 to 2012, savings and the net lending/net borrowing of the total economy have been revised upwards in this publication by about 0.2 of a percentage point of GDP compared with the figures published in the central framework for the national accounts, all other things being equal.

